

## ABSTRACT

The “Tailed Flying Wing Aircraft” idea represents new aerodynamic concepts for large high subsonic aircraft. Large high subsonic aircraft based on these new aerodynamic concepts are having a significantly higher lift capacity and longer range, as well as a significantly lower fuel consumption of at least two times less than the aircraft based on classical fuselage concept with the same external dimensions. In addition, the aircraft based on the new concepts are having a significantly better longitudinal stability and maneuverability, as well as aerodynamic efficiency at high subsonic speed than aircraft based on “Tailless Flying Wing” concepts. The aircraft based on the “Tailed Flying Wing Aircraft” idea satisfy all safety requirements for civil aircraft. They also have simple shapes for manufacturing, hence this idea provides for new realistic advanced aerodynamic concepts for the next generations of large subsonic aircraft.